

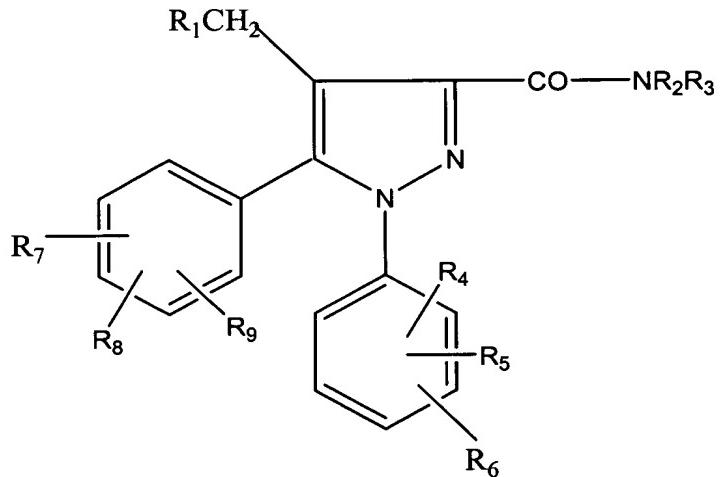
WHAT IS CLAIMED IS:

1 1. A method of reducing food consumption in a mammal, said method
2 comprising administering to said mammal a first compound which is a PPAR α agonist and a
3 second compound which is an antagonist of the CB1 cannabinoid receptor, whereby the
4 consumption of food by the animal is reduced.

1 2. The method according to claim 1, wherein the PPAR α agonist is an
2 OEA-like agonist.

1 3. The method of claim 1, wherein the PPAR α agonist is
2 oleoylethanolamide, palmitoylethanolamide or elaidoylethanolamide.

1 4. The method of claim 1, wherein the antagonist is a pharmaceutically
2 acceptable salt or solvate of a compound of the formula:



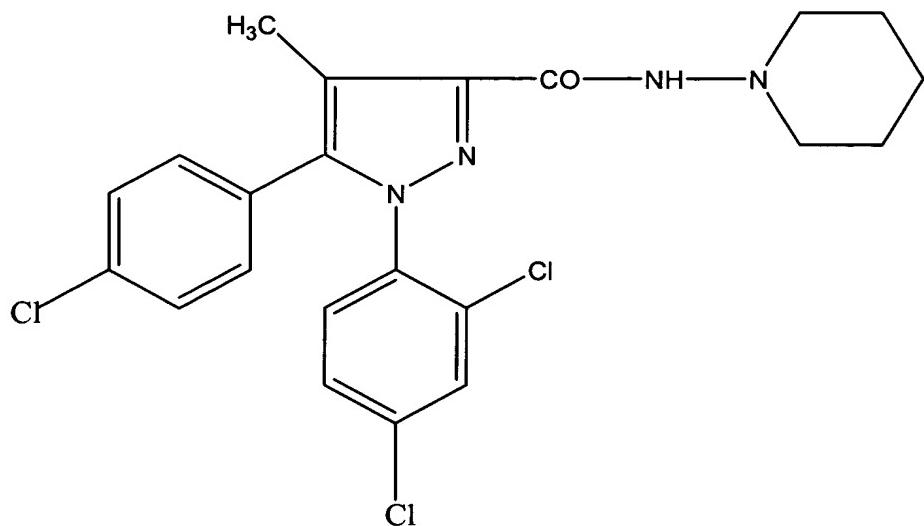
4 wherein R_1 is hydrogen, a fluorine, a hydroxyl, a $(\text{C}_1\text{-}\text{C}_5)$ alkoxy, a $(\text{C}_1\text{-}\text{C}_5)$ alkylthio, a hydroxy $(\text{C}_1\text{-}\text{C}_5)$ alkoxy, a group $-\text{NR}_{10}\text{R}_{11}$, a cyano, a $(\text{C}_1\text{-}\text{C}_5)$ alkylsulfonyl or
5 6 a $(\text{C}_1\text{-}\text{C}_5)$ alkylsulfinyl;

7 R_2 and R_3 are a $(\text{C}_1\text{-}\text{C}_4)$ alkyl or, together with the nitrogen atom to which they
8 are bonded, form a saturated or unsaturated 5- to 10-membered heterocyclic radical which is
9 unsubstituted or monosubstituted or polysubstituted by a $(\text{C}_1\text{-}\text{C}_3)$ alkyl or by a $(\text{C}_1\text{-}\text{C}_3)$ alkoxy;

10 R₄, R₅, R₆, R₇, R₈ and R₉ are each independently hydrogen, a halogen or a
11 trifluoromethyl, and if R₁ is a fluorine, R₄, R₅, R₆, R₇, R₈ and/or R₉ can also be a
12 fluoromethyl, with the proviso that at least one of the substituents R₄ or R₇ is other than
13 hydrogen; and

14 R₁₀ and R₁₁ are each independently hydrogen or a (C₁-C₅)alkyl, or R₁₀ and R₁₁,
15 together with the nitrogen atom to which they are bonded, form a heterocyclic radical
16 selected from pyrrolidin-1-yl, piperidin-1-yl, morpholin-4-yl and piperazin-1-yl, which is
17 unsubstituted or substituted by a (C₁-C₄)alkyl.

1 5. The method of claim 4, wherein said antagonist is of the formula:

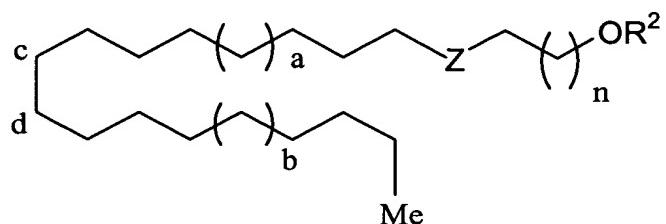


2 2 or a pharmaceutically acceptable salt thereof.

1 6. A method according to claim 1, wherein the mammal is human.

1 7. A method according to claim 6, wherein said human is overweight or
2 obese.

1 8. A method according to claim 1, wherein the PPAR α agonist is a
2 compound of the following formula:



3

4 wherein n is any number from 0 to 5;
5 the sum of a and b can be any number from 0 to 4;
6 Z is a member selected from -C(O)N(R⁰)-; -(R⁰)NC(O)-; -OC(O)-; -(O)CO-;
7 O; NR⁰; and S, in which R⁰ and R² are independently selected from the group consisting of
8 substituted or unsubstituted alkyl, hydrogen, substituted or unsubstituted C₁ –C₆ alkyl,
9 substituted or unsubstituted lower (C₁-C₆) acyl, homoalkyl, and aryl;
10 up to eight hydrogen atoms of the compound may also be substituted by
11 methyl group or a double bond; and
12 the molecular bond between carbons c and d may be unsaturated or saturated,
13 or a pharmaceutically acceptable salt thereof.

1 9. A method according to claim 1, wherein said PPAR α agonist is
2 administered with a pharmaceutically acceptable carrier by an oral, rectal, topical, or
3 parenteral route.

1 10. A method according to claim 1, wherein said antagonist is
2 administered with a pharmaceutically acceptable carrier by an oral, rectal, topical, or
3 parenteral route.

1 11. A method according to claim 1, wherein said antagonist and said
2 PPAR α agonist are administered together.

1 12. A method according to claim 1, wherein said antagonist and said
2 PPAR α agonist are each administered in an amount below their individual ED₅₀.

1 13. A method according to claim 1, wherein said antagonist and said
2 PPAR α agonist are each administered in an amount below their individual ED₁₀.

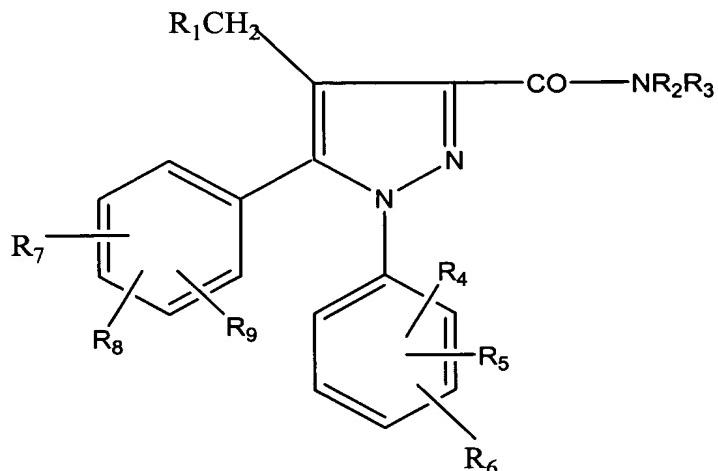
1 14. A method according to claim 1, wherein at least one of said antagonist
2 and said PPAR α agonist is administered in an amount below its ED₁₀.

1 15. A method according to claim 1, wherein at least one of said antagonist
2 and said PPAR α agonist is administered in an amount below its ED₅₀.

1 16. A pharmaceutical composition for reducing food consumption in a
2 mammal, said composition comprising a PPAR α agonist and a cannabinoid CB1 receptor.

1 17. The composition according to claim 16, wherein the PPAR α agonist is
2 oleoylethanolamide.

1 18. The composition according to claim 17, wherein the antagonist is a
2 pharmaceutically acceptable salt or solvate of a compound of the formula:



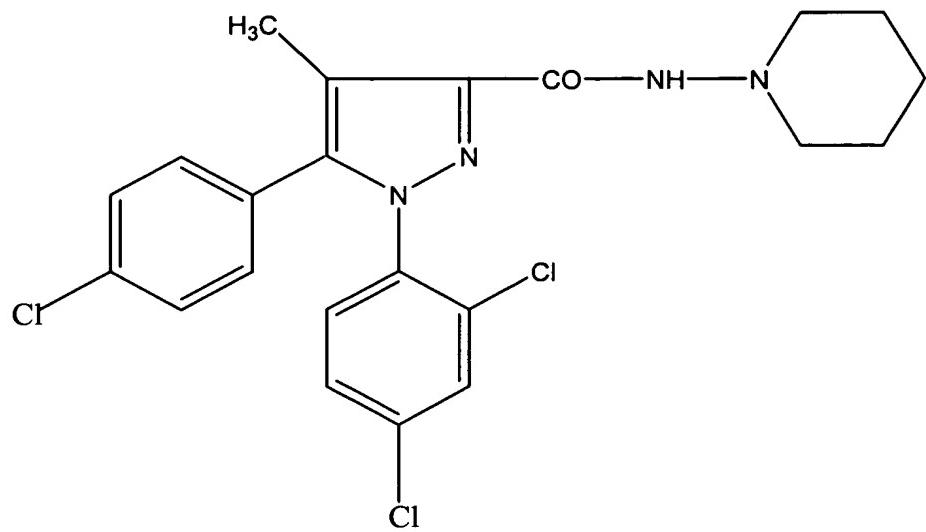
3
4 wherein R₁ is hydrogen, a fluorine, a hydroxyl, a (C₁-C₅)alkoxy, a (C₁-
5 C₅)alkylthio, a hydroxy(C₁-C₅)alkoxy, a group -NR₁₀R₁₁, a cyano, a (C₁-C₅)alkylsulfonyl or
6 a (C₁-C₅)alkylsulfinyl;

7
8
9 R₂ and R₃ are a (C₁-C₄)alkyl or, together with the nitrogen atom to which they
are bonded, form a saturated or unsaturated 5- to 10-membered heterocyclic radical which is
unsubstituted or monosubstituted or polysubstituted by a (C₁-C₃)alkyl or by a (C₁-C₃)alkoxy;

10
11
12
13 R₄, R₅, R₆, R₇, R₈ and R₉ are each independently hydrogen, a halogen or a
trifluoromethyl, and if R₁ is a fluorine, R₄, R₅, R₆, R₇, R₈ and/or R₉ can also be a
fluoromethyl, with the proviso that at least one of the substituents R₄ or R₇ is other than
hydrogen; and

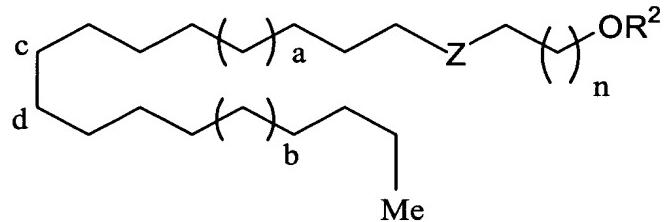
14
15
16
17 R₁₀ and R₁₁ are each independently hydrogen or a (C₁-C₅)alkyl, or R₁₀ and R₁₁,
together with the nitrogen atom to which they are bonded, form a heterocyclic radical
selected from pyrrolidin-1-yl, piperidin-1-yl, morpholin-4-yl and piperazin-1-yl, which is
unsubstituted or substituted by a (C₁-C₄)alkyl.

1
2 19. The composition according to claim 17, wherein said antagonist is of the
formula:



4 or a pharmaceutically acceptable salt thereof.

1 20. The composition according to claim 17, wherein the PPAR α agonist is
2 a fatty acid alkanolamide of the formula:



4 wherein n is any number from 0 to 5;

5 the sum of a and b can be any number from 0 to 4;

6 Z is a member selected from $-C(O)N(R^o)$ -; $-(R^o)NC(O)-$; $-OC(O)-$; $-(O)CO-$;

7 O; NR^o ; and S, in which R^o and R^2 are independently selected from the group consisting of

8 substituted or unsubstituted alkyl, hydrogen, substituted or unsubstituted $C_1 - C_6$ alkyl,

9 substituted or unsubstituted lower ($C_1 - C_6$) acyl, homoalkyl, and aryl;

10 up to eight hydrogen atoms of the compound may also be substituted by

11 methyl group or a double bond; and

12 the molecular bond between carbons c and d may be unsaturated or saturated.

1 21. The composition according to claim 17, wherein said composition is in
2 a formulation suitable for administration by an oral, rectal, topical, or parenteral route of
3 administration.

1 22. The composition according to claim 17, wherein said composition is in
2 unit dosage format.

1 23. The composition according to claim 22, wherein at least one of said
2 antagonist and said agonist is in an amount below its ED₁₀.

1 24. The composition according to claim 22, wherein at least one of said
2 antagonist and said alkanolamide is in an amount below its ED₅₀.

1 25. The composition according to claim 16, wherein the antagonist has an
2 IC₅₀ for the CB1 cannabinoid receptor which is less than one-fourth its IC₅₀ for the CB2
3 cannabinoid receptor.

1 26. The composition according to claim 20, wherein R⁰ and R² are
2 members independently selected from the group comprising hydrogen, C₁-C₃ alkyl, and
3 lower (C₁-C₃) acyl.

1 27. The composition according to claim 20, wherein a = 1 and b = 1.

1 28. The composition according to claim 20, wherein n = 1.

1 29. The composition according to claim 20, wherein R¹ and R² are each H.

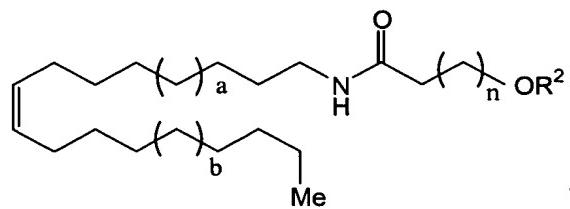
1 30. The composition according to claim 20, wherein the bond between
2 carbon c and carbon d is a double bond.

1 31. The composition according to claim 20, wherein the alkanolamide or
2 its homologue is according to one of the following formulae:

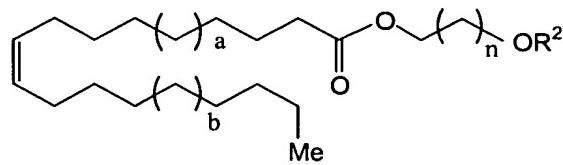
3

4

5

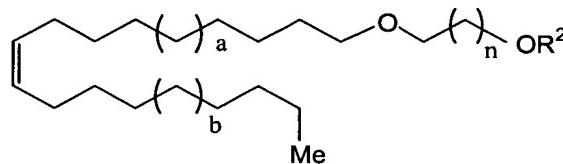


6



, and

7



8

9

10 wherein n is from 1-5 and the sum of a and b is from 0 to 4; R² is selected
11 from the group consisting of hydrogen, C₁-C₆ alkyl, and lower (C₁-C₆) acyl; and up to four
12 hydrogen atoms of the fatty acid portion and alkanol portion thereof may also be substituted
13 by methyl or a double bond.

1 32. A composition of claim 16, wherein the PPAR α agonist is selected
2 from the group consisting of clofibrate; fenofibrate, bezafibrate, gemfibrozil, and ciprofibrate.

1 33. A composition of claim 31, wherein the cannabinoid receptor
2 antagonist is rimonabant.

1 34. A method of treating an appetency disorder in a human by
2 administering a composition according to claim 17.

1 35. A method according to claim 34, wherein the appetite for a food,
2 ethanol, or a psychoactive substance is to be reduced.